PMON2000 MIPS Initializing. Standby...

ERRORPC=00000000 CONFIG=80000480

PRID=00004220

DDR2 config begin\_2

DDR2 config end

Init caches...

godson1 caches found

Init caches done, cfg = 80000480

press gb to boot

presss h for help

end test

Copy PMON to execute location...

a1050000

copy text section done.

Copy PMON to execute location done.

sp=80ffc000Uncompressing Bios...........................OK,Booting Bios

FREQ

FREI

DONE

DEVI

ENVI

MAPV

in envinit

NVRAM@82fff8b0

STDV

80100000: memory between 82fff400-83000000 is already been allocated,heap is a lready above this point

SBDD

DINI

==gpio: gpio status 0

NETI

RTCL

begin fb\_init

enter dc\_init...

frame buffer addr: 2000000

framebuffer Cursor Configuration

framebuffer Cursor Address

framebuffer Cursor Location

framebuffer Cursor Background

what hell is this register for ?

display controller reg config complete!

cfb\_console init,fb=a2000000

Video: Drawing the logo ...

CONSOLE\_SIZE 563200

after fb\_init

====before configure

in configure

mainbus0 (root)

localbus0 at mainbus0

syn0 at localbus0Now Going to Call register\_netdev to register the network inter face for GMAC core

DATA after Reset = 00020101

Now Registering the netdevice

in if attach

register poll interrupt: gmac 0

sdcard0 at localbus0ohci0 at localbus0

-----lohci\_atttch------

OHCI 83e02800 initialized ok

drive at ohci0 devnum 2, Product USB2.0 Hub

not configured

drive at ohci0 devnum 1, Product OHCI Root Hub

not configured

loopdev0 at mainbus0out configure

====before init ps/2 kbd

devconfig done.

ifinit done.

domaininit done.

init\_proc....

network configure 'syn0:192.168.31.123'

===phy FULLDUPLEX MODE

Link UP data=00000022

Link is up in FULL DUPLEX mode

Link is with 100M Speed

bootp=8000bc2c

DATA after Reset = 00020101

Version = 0x1137

The data read from 800f0700 is bfe10020

MacAddr = 0x0 0x55 0x7b 0xb5 0x7d 0xf7

Total size of memory required for Tx Descriptors in Ring Mode = 0x00000600

===Tx first\_desc: a3e0b800

total size of memory required for Rx Descriptors in Ring Mode = 0x00000c00

===phy FULLDUPLEX MODE

DMA status reg = 0x0 before cleared!

DMA status reg = 0x0 after cleared!

===phy FULLDUPLEX MODE

==arp\_ifinit done

HSTI

SYMI

SBDE

[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[

[[[ [[[[ [[[[[[[[[[ [[[[ [[[[ [[[[[[[ [[

[[ [[[[[[[[ [[[ [[[[[[[[ [[[ [[[[[[[[ [[[ [[[[[[ [[

[[ [[[[[[[[[[ [[[ [ [[[[[[ [ [[[ [[[[[[[[[[ [[[ [ [[[[[ [[

[[ [[[[[[[[[[ [[[ [[ [[[[ [[ [[[ [[[[[[[[[[ [[[ [[ [[[[ [[

[[ [[[[[[[[ [[[ [[[ [[ [[[ [[[ [[[[[[[[[[ [[[ [[[ [[[ [[

[[ [[[[ [[[[ [[[[ [[[ [[[[[[[[[[ [[[ [[[[ [[ [[

[[ [[[[[[[[[[[[[[[ [[[[[ [[[[[ [[[ [[[[[[[[[[ [[[ [[[[[ [ [[

[[ [[[[[[[[[[[[[[[ [[[[[[[[[[[[ [[[ [[[[[[[[[[ [[[ [[[[[[ [[

[[ [[[[[[[[[[[[[[[ [[[[[[[[[[[[ [[[ [[[[[[[[ [[[ [[[[[[[ [[

[[ [[[[[[[[[[[[[[[ [[[[[[[[[[[[ [[[[ [[[[ [[[[[[[[ [[

[[[[[[[2005][[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[[

Configuration [FCR,EL,NET]

Version: PMON2000 2.1 (ls1b) #6: 2021年09月10日 11:46:41 .

Supported loaders [srec, elf, bin]

Supported filesystems [sdcard, mtd, net, fs/yaffs2, fat, fs, disk, socket, tty, ram]

This software may be redistributed under the BSD copyright.

Copyright 2000-2002, Opsycon AB, Sweden.

Copyright 2005, ICT CAS.

CPU GODSON1 @ 200.00 MHz / Bus @ 99.99 MHz

Memory size 64 MB ( 64 MB Low memory, 0 MB High memory) .

Primary Instruction cache size 8kb (32 line, 2 way)

Primary Data cache size 8kb (32 line, 2 way)

BEV1

BEV0

BEV in SR set to zero.

NAND DETE

NAND device: Manufacturer ID: 0x9b, Chip ID: 0xf1 (Unknown NAND 128MiB 3,3V 8-bit)

Scanning device for bad blocks

NANDFlash info:

erasesize 131072 B

writesize 2048 B

oobsize 64 B

AUTO

Press <Enter> to execute loading image:/dev/mtd0

Press any other key to abort. 00

Loading file: /dev/mtd0

/dev/mtd0: boot failed

PMON> load tftp://192.168.31.163/vmlinux-fb

Loading file: tftp://192.168.31.163/vmlinux-fb (elf)

0x80200000/10026804 + 0x80b8ff34/258204(z) +

Entry address is 802042a0

PMON> g console=ttyS3,115200 rdinit=/sbin/init

zero at v0 v1 a0 a1 a2 a3

00000000 00000000 00000000 00000000 00000004 a3dffcf8 a3dffd0c 800c40d0

t0 t1 t2 t3 t4 t5 t6 t7

00000000 00000000 00000000 00000000 00000000 00000000 00000000 00000000

s0 s1 s2 s3 s4 s5 s6 s7

00000000 00000000 00000000 00000000 00000000 00000000 00000000 00000000

t8 t9 k0 k1 gp sp s8 ra

00000000 00000000 00000000 00000000 00000000 a3dffcd8 00000000 8007c6e8

===ioctl1 sifflags

synopGMAC\_linux\_close

Memory allocated a3e0c000 for Rx Desriptors (ring) is given back

Linux version 2.6.32.13 (root@weirdo-X555LI) (gcc version 4.3.6 20101004 (prerelease) (GCC) ) #36 Sat Oct 9 10:38:09 CST 2021

busclock=99993600, cpuclock=200000000, memsize=64, highmemsize=0

bootconsole [early0] enabled

CPU revision is: 00004220 (ICT Loongson-232)

Determined physical RAM map:

memory: 04000000 @ 00000000 (usable)

Initrd not found or empty - disabling initrd

Zone PFN ranges:

Normal 0x00000000 -> 0x00001000

Movable zone start PFN for each node

early\_node\_map[1] active PFN ranges

0: 0x00000000 -> 0x00001000

Built 1 zonelists in Zone order, mobility grouping off. Total pages: 4088

Kernel command line: console=ttyS3,115200 rdinit=/sbin/init mtdparts=nand-flash:10M@0(kernel)ro,-(rootfs) root=/dev/hda1 mtdparts=nand-flash:10M@0(kernel)ro,-(rootfs)

PID hash table entries: 256 (order: -4, 1024 bytes)

Dentry cache hash table entries: 8192 (order: 1, 32768 bytes)

Inode-cache hash table entries: 4096 (order: 0, 16384 bytes)

Primary instruction cache 8kB, VIPT, 2-way, linesize 32 bytes.

Primary data cache 8kB, 2-way, VIPT, no aliases, linesize 32 bytes

Memory: 52832k/65536k available (4619k kernel code, 12704k reserved, 1206k data, 3952k init, 0k highmem)

Hierarchical RCU implementation.

NR\_IRQS:256

Console: colour dummy device 80x25

Calibrating delay loop... 198.14 BogoMIPS (lpj=396288)

Mount-cache hash table entries: 2048

devtmpfs: initialized

NET: Registered protocol family 16

bio: create slab <bio-0> at 0

SCSI subsystem initialized

usbcore: registered new interface driver usbfs

usbcore: registered new interface driver hub

usbcore: registered new device driver usb

Switching to clocksource MIPS

NET: Registered protocol family 2

IP route cache hash table entries: 4096 (order: 0, 16384 bytes)

TCP established hash table entries: 2048 (order: 0, 16384 bytes)

TCP bind hash table entries: 2048 (order: -1, 8192 bytes)

TCP: Hash tables configured (established 2048 bind 2048)

TCP reno registered

NET: Registered protocol family 1

RPC: Registered udp transport module.

RPC: Registered tcp transport module.

RPC: Registered tcp NFSv4.1 backchannel transport module.

Installing knfsd (copyright (C) 1996 okir@monad.swb.de).

NTFS driver 2.1.29 [Flags: R/W].

fuse init (API version 7.13)

msgmni has been set to 103

alg: No test for stdrng (krng)

Block layer SCSI generic (bsg) driver version 0.4 loaded (major 253)

io scheduler noop registered

io scheduler anticipatory registered

io scheduler deadline registered

io scheduler cfq registered (default)

ls1x\_fb init

videomemorysize=bb800

videomemory:a3d00000::3d00000

fb0: Virtual frame buffer device, using 750K of video memory

Serial: 8250/16550 driver, 4 ports, IRQ sharing disabled

serial8250.0: ttyS0 at MMIO 0x1fe40000 (irq = 2) is a 16550A

serial8250.0: ttyS1 at MMIO 0x1fe4c000 (irq = 5) is a 16550A

serial8250.0: ttyS2 at MMIO 0xbfe6c000 (irq = 29) is a 16550A

serial8250.0: ttyS3 at MMIO 0xbfe7c000 (irq = 30) is a 16550A

console [ttyS3] enabled, bootconsole disabled

console [ttyS3] enabled, bootconsole disabled

serial8250 serial8250.0: unable to register port at index 4 (IO8070e950 MEM807a4620 IRQ-2096872576): -28

serial8250 serial8250.0: unable to register port at index 5 (IO7 MEM0 IRQ1): -28

serial8250 serial8250.0: unable to register port at index 6 (IO80786858 MEM0 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 7 (IO80785d4c MEM0 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 8 (IO8070e95c MEM807a4620 IRQ-2096872320): -28

serial8250 serial8250.0: unable to register port at index 9 (IO7 MEM0 IRQ1): -28

serial8250 serial8250.0: unable to register port at index 10 (IO80785ea0 MEM0 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 11 (IO80785e0c MEM0 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 12 (IO8070e95c MEM807a4620 IRQ-2096872448): -28

serial8250 serial8250.0: unable to register port at index 13 (IO7 MEM0 IRQ1): -28

serial8250 serial8250.0: unable to register port at index 14 (IO80785d20 MEM0 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 15 (IO80785ecc MEM0 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 16 (IO3ef1480 MEM6 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 17 (IO5 MEMd IRQ0): -22

serial8250 serial8250.0: unable to register port at index 18 (IOc MEM14 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 19 (IO13 MEM1b IRQ0): -22

serial8250 serial8250.0: unable to register port at index 20 (IO1a MEM22 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 21 (IO21 MEM7 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 22 (IO8 MEM10 IRQ0): -22

serial8250 serial8250.0: unable to register port at index 23 (IO5 MEM0 IRQ0): -22

NAND device: Manufacturer ID: 0x9b, Chip ID: 0xf1 (Unknown NAND 128MiB 3,3V 8-bit)

Scanning device for bad blocks

2 cmdlinepart partitions found on MTD device nand-flash

Creating 2 MTD partitions on "nand-flash":

0x000000000000-0x000000a00000 : "kernel"

0x000000a00000-0x000008000000 : "rootfs"

vcan: Virtual CAN interface driver

CAN device driver interface

sja1000 CAN netdevice driver

sja1000\_platform sja1000\_platform.1: sja1000\_platform device registered (reg\_base=bfe50000, irq=6)

stmmac - user ID: 0x11, Synopsys ID: 0x37

DMA HW capability register supported

Normal descriptors

RX Checksum Offload Engine supported

TX Checksum insertion supported

Wake-Up On Lan supported

stmmac - user ID: 0x11, Synopsys ID: 0x37

DMA HW capability register supported

Normal descriptors

RX Checksum Offload Engine supported

TX Checksum insertion supported

Wake-Up On Lan supported

mice: PS/2 mouse device common for all mice

i2c /dev entries driver

usbcore: registered new interface driver usbhid

usbhid: v2.6:USB HID core driver

Advanced Linux Sound Architecture Driver Version 1.0.21.

Algorithmics/MIPS FPU Emulator v1.5

ALSA device list:

No soundcards found.

TCP cubic registered

NET: Registered protocol family 17

can: controller area network core (rev 20090105 abi 8)

NET: Registered protocol family 29

can: raw protocol (rev 20090105)

can: broadcast manager protocol (rev 20090105 t)

drivers/rtc/hctosys.c: unable to open rtc device (rtc0)

Freeing unused kernel memory: 3952k freed

mount: mounting n on /proc/bus/usb failed: No such file or directory

mdev: /sys/class: No such file or directory

login

Godson2@[/]>ifconfig -a

can0 Link encap:UNSPEC HWaddr 00-00-00-00-00-00-00-00-00-00-00-00-00-00-00-00

NOARP MTU:16 Metric:1

RX packets:0 errors:0 dropped:0 overruns:0 frame:0

TX packets:0 errors:0 dropped:0 overruns:0 carrier:0

collisions:0 txqueuelen:10

RX bytes:0 (0.0 B) TX bytes:0 (0.0 B)

Interrupt:6

eth0 Link encap:Ethernet HWaddr E6:6A:D5:49:B4:3A

BROADCAST MULTICAST MTU:1500 Metric:1

RX packets:0 errors:0 dropped:0 overruns:0 frame:0

TX packets:0 errors:0 dropped:0 overruns:0 carrier:0

collisions:0 txqueuelen:1000

RX bytes:0 (0.0 B) TX bytes:0 (0.0 B)

Interrupt:34

eth1 Link encap:Ethernet HWaddr EE:03:27:E3:35:77

BROADCAST MULTICAST MTU:1500 Metric:1

RX packets:0 errors:0 dropped:0 overruns:0 frame:0

TX packets:0 errors:0 dropped:0 overruns:0 carrier:0

collisions:0 txqueuelen:1000

RX bytes:0 (0.0 B) TX bytes:0 (0.0 B)

Interrupt:35

lo Link encap:Local Loopback

inet addr:127.0.0.1 Mask:255.0.0.0

UP LOOPBACK RUNNING MTU:16436 Metric:1

RX packets:0 errors:0 dropped:0 overruns:0 frame:0

TX packets:0 errors:0 dropped:0 overruns:0 carrier:0

collisions:0 txqueuelen:0

RX bytes:0 (0.0 B) TX bytes:0 (0.0 B)

Godson2@[/]>ifconfig eth0 up

eth0: device MAC address e6:6a:d5:49:b4:3a

stmmac: probed

eth0: PHY ID 0181b8a0 at 17 IRQ 0 (stmmac-0:11) active

Godson2@[/]>PHY: stmmac-0:11 - Link is Up - 100/Full